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ABSTRACT

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**Parenting Style and Family Environment as They Relate to
Academic Achievement and Problem Behaviors in Older Adolescents**

Paper presented at the Annual Convention of the National Association of School Psychologists.

Atlanta, Georgia

March 15, 1996

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Abstract

Research on the four prototypic parenting styles has consistently demonstrated their relationship to psychosocial adjustment in offspring ranging in age from preschool children to high school students. The present study used self-report surveys administered to 2255 graduating high school seniors (HS) and 419 second-semester university freshmen (UF). Students indicated their levels of participation in problem behaviors and conventional behaviors, as well as ratings of their perceptions of their parents on 3 parenting dimensions: acceptance (responsiveness), behavioral control (demandingness), and democracy (psychological autonomy-granting). Based on these values, students could be assigned to 1 of 6 groups representing the parenting style with which they were reared: authoritative plus, authoritative, authoritarian, "good enough," indulgent, and neglectful. The study found that the "democracy" dimension, although an important component of parenting, was not needed to effectively define authoritative parenting after the other 2 dimensions were considered. Parenting style was significantly related to older adolescent behavioral outcome in the HS sample ($p < .0001$) and in the UF sample ($p < .05$). This study extends the age range for which the classic parenting style typology applies from high school students in general to graduating high school seniors and college freshmen and expands the parenting style typology to include a 5th, middle range, parenting style. Previously established advantages and disadvantages of the four classic parenting styles, plus the middle range style, persist even when they were extended into older adolescence. Influence of parenting style appears to wane with increasing age of older adolescents, especially after a semester of college.

Relationship of Parenting Style to Behavioral Outcome in Older Adolescents

Nearly 30 years ago Baumrind (1967, 1971) noted that preschool children reared by parents with differing parenting attitudes, or styles, differed in their degrees of social competence. Her theory-derived parent classification resulted in the original parenting style prototypes: authoritative, authoritarian, and permissive. Later researchers split the permissive type into permissive-indulgent and permissive-indifferent (Baumrind, 1978; Maccoby & Martin, 1983) as a result of a two-dimensional (demandingness and responsiveness) typology of parenting patterns. The resultant fourfold scheme established the four parenting styles which are commonly employed in today's research literature (e.g., Lamborn, Mounts, Steinberg, & Dornbusch, 1991; Steinberg, Lamborn, Darling, Mounts, & Dornbusch, 1994): authoritative, authoritarian, indulgent, and neglectful.

Baumrind's typological parenting style theory implies that the manner in which parents "reconcile the joint needs of children for nurturance and limit-setting" (Baumrind, 1991a, p. 62) has a major impact on the behavioral outcome of these children. In her follow-up studies with preschoolers, Baumrind continued to increase the age range for which her theoretical view of parenting applied. At time two, the same children who were first studied as preschoolers were revisited at 9 years of age (Baumrind, 1978). Later Baumrind reported on these same children as 15 year olds (1991a), each time finding a strong relationship between parenting style and degree of social competence in her study children. Others (Dornbusch, Ritter, Leiderman, Roberts, & Fraleigh, 1987; Steinberg, Elmen, & Mounts 1989) have continued to increase the age range for which significance of parenting style applies. For example, most recent research in this area used a large scale sample of 14- to 18-year-old students in grades 9 through 12 from nine high schools in Wisconsin and northern California (Durbin, Darling, Steinberg, & Brown, 1993; Lamborn et al., 1991; Steinberg, Fegley, & Dornbusch, 1993; Steinberg, Lamborn, Dornbusch, & Darling, 1992; Steinberg et al., 1994). Significant differences have been found not only in children but also in early and middle adolescents reared by parents using the four "classic" parenting styles. Those behavioral and psychosocial characteristics which have been reported in the literature as associated with parenting style include social competence (Baumrind, 1991a; Lamborn et al., 1991; Steinberg, 1990), academic achievement (Dornbusch

et al., 1987; Lamborn et al., 1991; Steinberg, Mounts, Lamborn, & Dornbusch, 1991; Steinberg et al., 1989), self-reliance (Steinberg et al., 1991), psychological distress and delinquency (Lamborn et al., 1991; Steinberg et al., 1991), substance use (Baumrind, 1991a), adolescent drinking and delinquency (Barnes & Farrell, 1992), and peer group selection (Brown, Mounts, Lamborn, & Steinberg, 1993). In general, the results of these studies indicate that adolescents reared by authoritative parents experience the most favorable outcomes, while those reared by neglectful parents have outcomes that are least favorable in regard to psychological adjustment and social conduct. The "middle two" parenting styles (authoritarian and indulgent) result in mixed outcomes for the adolescent population (Steinberg & Darling, 1994). Although prior studies support Baumrind's parenting style theory for middle adolescents, we currently know little about the effect of parenting style on older adolescents, whether parenting styles maintain their same relative degrees of relationship with behavioral outcome in this more mature age group, and whether this prior relationship wanes with increasing age of the adolescents.

Jessor and colleagues have developed Problem-Behavior Theory which posits that a multivariate profile of sociopsychological characteristics can be used to predict the likelihood of the occurrence of problem behavior in adolescents based on the prevalence and severity of its components (Donovan & Jessor, 1978). In other words, if conditions are ripe for the development of one problem behavior, then those same conditions may foster other problem behaviors, as well. Relating Jessor's theory to what we know about parenting style theory: if lack of parental monitoring (e.g., low on the behavioral control dimension), for example, sets the stage, as in neglectful parenting, for one adolescent problem behavior such as marijuana use, that same parenting deficit could foster other problem behaviors, such as problem drinking. Jessor et al., in their cross-sequential studies of high school and college students (Donovan & Jessor, 1978; Jessor & Jessor, 1977), found strong evidence which suggests a single underlying common factor, "unconventionality" (psychosocial proneness for problem behavior), that is responsible for the relationships among outcome variables (Donovan & Jessor, 1985). They also found "a considerable degree of continuity between adolescence and young adulthood in the interrelations among the different problem behaviors" (p. 902), noting that if one problem behavior continues from adolescence into young adulthood, other problem behaviors associated with it are also likely to continue. Although about half of the male

problem drinkers from Jessor & Jessor's college sample, for example, continued to be problem drinkers in young adulthood, the other half entered the nonproblem drinker category, suggesting an equal chance in males for continuity of problem behavior proneness into young adulthood (Donovan, Jessor, & Jessor, 1983). This research group concluded that individuals with more psychosocial proneness for problem behavior in adolescence are at greater risk of young adult problem behavior than are those adolescents with less proneness for problem behavior. If these results are considered within a parenting style framework, then a neglectful parenting style, for example, which is related to problem behavior "proneness" in middle adolescence, may also relate to continued proneness in late adolescence and early adulthood, especially for those older adolescents with relatively more psychosocial "proneness".

One parenting style which is often forgotten is a mid-range style. Borrowing Baumrind's (1991a) term, "good enough" parent, a fifth parenting style was included in the present study. This is the parenting style which often is lost when tertile splits are used in order to assign parents to the four classic parenting styles. Customarily, because these good enough parents fall in the moderate range on both the behavioral control and acceptance dimensions, they are "excluded from the analysis in order to ensure that the four groups of families represent distinct categories" (Lamborn et al., 1991, p. 1053). Baumrind (1991a) added this parenting style to her most recent study "with the thought that this moderate level of commitment would suffice to prevent problem behavior and to assure adequate competence during the adolescent stage of development" (p. 63). The good enough parenting style was included in the present study for similar comparison value. Would parenting consisting of moderate amounts of acceptance and moderate amounts of behavioral control be related to older adolescents with moderate amounts of problem behavior and moderate amounts of conventional behavior? Moderate amounts of problem behavior related to "moderate" parenting could corroborate the presumed linearity of parenting dimensions used to define the parenting styles.

In recent studies completed by Steinberg and his colleagues, generally one of two techniques has been used to determine parenting style research groupings. The first technique is the grouping of high and low scorers on responsiveness and demandingness dimensions according to Maccoby and Martin's (1983) two-dimensional, fourfold typology (e.g., see Durbin et al., 1993; Lamborn et al., 1991). This typology

provides four discrete, heuristic groups for study. The second technique, used more recently, is one in which a third parenting dimension --psychological autonomy-granting-- is incorporated into authoritative parenting along with the responsiveness and demandingness dimensions. Psychological autonomy-granting (or democracy) has surfaced periodically over the past 30 years in work such as Schaefer's (1965) study of the assessment of parenting practices through children's reports, in Steinberg's (1990) factor analysis of parenting behaviors, and in Baumrind's cluster analysis of parenting dimensions (1991a, 1991b). However, because this third parenting dimension has been found to play a major role only in authoritative parenting (Steinberg et al., 1994), it is assumed to have no practical application to the other parenting styles within the fourfold typology. Therefore, in studies incorporating the democracy dimension (in addition to the acceptance and behavioral control dimensions), parents typically have been categorized on an ordinal measure as "authoritative," "somewhat nonauthoritative," or "nonauthoritative." This rating on "authoritativeness" in parenting style is accomplished without regard to parents' positions in the classic fourfold typology (e.g., see Steinberg et al., 1991; Steinberg, Lamborn et al., 1992), but rather considers only how "authoritative" they are in relation to other parents in the sample. To date, studies have not used both of these approaches together, therefore, we do not know what the contribution of democracy is to the other parenting styles or if there is any practical utility to incorporating democracy, over and above acceptance and behavioral control, into our usual definition of authoritative parenting. Because there is no clear precedent for the inclusion or exclusion of democracy in our operationalization of authoritative parenting, it is important to determine if its existence can be validated statistically. Toward that end, the present study considered both of the above-mentioned approaches simultaneously; that is, the two-dimensional, fourfold parenting style typology was used, then another category of parenting, "authoritative plus", was added, defined by high scores not only on behavioral control and acceptance, but also on democracy.

In summary, the present study intended to expand earlier research in three important ways. First, this study used samples of older adolescents, namely, graduating high school seniors and second semester university freshmen. Because parenting style has been shown to be highly influential in middle adolescent behavioral outcome, and because proneness toward problem behavior in middle adolescence suggests

proneness in older adolescence and young adulthood (Donovan et al, 1983), it was expected that parenting style influence would be apparent as related to older adolescent behavior, even in a college-aged student population, albeit to a somewhat lesser degree than in younger adolescents.

Second, it was expected that older adolescents, like middle adolescents, reared by authoritative and authoritative plus parents would experience the most favorable outcomes, while those reared by neglectful parents would experience outcomes which were the least favorable in regard to psychosocial adjustment. It was also expected that the "middle three" parenting styles (authoritarian, good enough, and indulgent) would result in mixed outcomes for the older adolescents. In other words, predictable relationships among the parenting styles, like those found in middle adolescence, would also be apparent in the two older adolescent samples.

Finally, it was expected that adding two additional parenting styles would enhance the validity and usefulness of the typology. Significant differences were expected to persist, without blurring distinct outcome categories, even when the range of parenting styles was expanded to six, as four parenting styles were thought to be inadequate to fully explain the range of parenting. In her latest research, Baumrind (1991a) reported that seven parenting styles were found (which represented further differentiation among the four prototypic types) when the parents of subjects were classified by two independent psychologists on the basis of transcripts of extensive interviews, observational procedures, and rating scales. The present study expected that parenting style determined through adolescent self-report would also support additional parenting styles. The first added parenting style was good enough parenting. As previously hypothesized by Baumrind (1991a), it was thought that good enough parenting would make a unique contribution to a parenting style model consistent with the moderate levels of the parenting dimensions by which it was defined. If good enough parenting were related to "good enough" behavior in older adolescents then a "good enough" or moderate style could be added to the typology which would markedly increase the utility of this model. In regard to the second added parenting style, level of democracy was expected to differentiate between authoritative and authoritative plus parenting (the sixth parenting style) making this another important addition to the typology.

Method

Participants

This sample was drawn from two sources. The first sample consisted of 2255 graduating high school seniors (range: 17-20 years; mean age = 17.69 years; 52% female) from 14 high schools in 8 counties in a middle South region. Cities from which these schools were drawn could be classified as suburban or rural. This sample was predominantly non-Hispanic White (89.3%).

The second sample consisted of 419 second semester freshmen students (range: 17-20 years; mean age = 18.45 years; 63% female) at a state university (total enrollment = 17,300 students) which draws mainly from the same middle South area surveyed in the high school sample above. This sample also was predominantly non-Hispanic White (84.5%). More detailed demographic characteristics of the entire sample and of the defined study samples are found in Table 1.

Procedure

High schools were contacted and invited to participate in this study. In return for their participation, school administrators were provided with the results of the study for their own school, reported in group format. "Passive parental consent" (see Steinberg et al., 1994, for a detailed explanation of this procedure) for the high school students aged 16 to 17 years was attempted. This procedure involves the assumption that when parents receive notification of a study, they will inform the school if they do not want their adolescent to participate in the study. However, in the majority of the high schools surveyed, administrators chose to use "active parental consent" (written parental permission to allow student participation) rather than passive consent for all students under age 18 years (37.9% of the total sample)¹. The usual informed consent procedures for students aged 18 years or older (62.1% of the total sample) was also used. It should be noted that the study was purposely delayed until late in the school year with the intent of finding more of the seniors who had celebrated their 18th birthday. Nevertheless, the procedure of requiring active parental consent may have resulted in a somewhat biased 16- to 17-year-old sample that over-represented better functioning adolescents and their parents who were responsible enough to sign and return the consent form to the school. Approximately 27% of the high school seniors either were absent on the day of the survey (a phenomenon known as "senioritis"), chose not to participate in the survey, or did

not return the parental consent form (if under age 18 years) and therefore, did not participate in the study. This 73% participation rate is quite good and is not unlike that found in other recent studies (Smetana, 1995).

For the university sample, students were surveyed through intact classes which are required for freshmen and in which freshmen typically enroll. These included beginning classes in psychology, sociology, education, and developmental studies. In return for their participation, many of the students were awarded extra credit points by their instructors. Approximately 15% of the university students were either absent on the day of the survey or chose not to participate. The college survey contained 200 items which included the 136 items of the high school survey (some of which were reworded slightly to make them more appropriate for a college population) plus additional items which were eliminated from the high school survey due to time constraints. All students in both samples were able to complete the survey in one sitting of 50 minutes.

Measures

This study used the two parenting dimensions suggested by Maccoby and Martin (1983), demandingness/behavioral control and responsiveness/acceptance, as well as the dimension of psychological autonomy-granting/democracy which "appears to be important in defining authoritativeness" (Steinberg et al., 1994, p. 757) but less so in differentiating among the other parenting styles. In addition, outcome variables which took the form of various scales and subscales, as well as demographic variables, were gathered.

Demographic variables

All participants provided information regarding their age, gender, ethnicity, socioeconomic status (SES), and family structure (see Table 1 for demographic details). Age was subdivided into three age groups: 16- to 17-year-olds, 18-year-olds, and 19- to 20-year-olds. Gender was used as a covariate in all analyses. Ethnicity was divided into three groups: non-Hispanic White, African American, and "other" which combined relatively small groups of Asian Americans, Hispanic Americans, Native Americans, and East Indians. SES was determined by educational level of the parents (see Brown et al., 1993; Dornbusch, Ritter, Mont-Reynaud, & Chin, 1990). Mother's highest educational level attained and father's highest

level attained were averaged. This distribution was then split into three groups: high school graduate or below; some college, vocational, or trade school after high school graduation; and college graduate or above. Family structure was limited to three groups. "Intact" were those families in which both biological parents still resided in the home with the adolescent. A second group was designated as "step-families." These were families of students who indicated that they lived most of the time at home with one biological parent and a step-parent. "Non-intact" families encompassed all other living situations, including a single parent alone, a single parent with other adults, living with other relatives, in a group home, or living with other adolescents or alone.

Parenting dimensions

The index of parenting style was in the form of three separate subscales, one for each of the parenting dimensions: behavioral control, acceptance, and democracy. The parenting style index currently in use by Steinberg and associates was provided to this author for use in the present study (personal communication, L. Steinberg, September 30, 1994). Although local factor analyses (both oblique and orthogonal) showed slightly different patterning of items, the subscales were used as provided without alteration in order to maintain comparability over studies.

Behavioral control. The 8-item behavioral control subscale assessed the degree of parental limit-setting and monitoring of the adolescent, as well as parental demands for mature behavior in the adolescent. It included such items as "In a typical week, what is the latest you can stay out on Friday and Saturday night?" and "How much do your parents try to know what you do with your free time?" with three possible responses ranging from "none" to "alot." (Reliability coefficient alpha - for the high school seniors: HS = .78 and for the university freshmen: UF = .82; test-retest reliability coefficient for the university freshmen², UF: $r_{xx} = .70$).

Acceptance. The 9-item acceptance subscale assessed the older adolescents' perceptions of involvement, responsiveness, warmth, and nurturance of their parents. Items such as "My family does fun things together" and "My parents spend time just talking to me" were scored on a four-option Likert scale from "agree strongly" to "disagree strongly." (HS alpha = .79; UF alpha = .81; UF: $r_{xx} = .88$).

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Democracy. The 9-item democracy subscale assessed the amount of psychological autonomy parents grant their adolescents in the form of encouragement to express their own opinions and individuality plus parental respect for those opinions. This dimension reflects democratic, rather than coercive, attitudes as the parents show tolerance for individual differences among family members. In older adolescents especially, this dimension fosters offspring who are individuated, yet connected to their families (Steinberg, 1990). Sample items included "My parents let me make my own plans for things I want to do" and "My parents tell me that their ideas are correct and that I should not question them," scored on a Likert scale from "agree strongly" to "disagree strongly" (HS alpha = .68; UF alpha = .71; UF: $r_{xx} = .67$).

In an attempt to minimize distortions in the adolescents' parental ratings, questions addressed concrete parental behaviors which support a parenting dimension rather than global ratings of parenting style. Adolescents in the present study responded to the parenting subscales with regard to "the parent with whom you have the most contact" or, in the case of two-parent families, with regard to their "parents." "Correlational bias," or the tendency for an adolescent to see two parents as very similar on parenting style, has been noted by Schwarz et al. (1985). In addition, other studies have found that adolescents' reports of fathers' and mothers' parenting does not differ significantly (Baumrind, 1991a; Smetana, 1995). Given this information, the rating of parents together seemed justified due to the limited time frame for surveying these students³. Finally, as a type of reliability check, students were queried regarding their degree of honesty in responding to the questionnaire items. In the high school senior sample, 95.3% of all students surveyed indicated that they had been mostly (9.4%) or totally (85.9%) honest in their responses. The college freshman sample indicated 92.4% honesty with 12.8% "mostly honest" and 79.6% "totally honest" in their responses.

Dependent variables

The two major dependent variables were unconventional/problem behavior and conventional behavior. A measure of conventional behavior can be viewed as a general test of discriminant validity for the unconventional scales (Donovan & Jessor, 1978). Each scale was determined through combining smaller scales found in the adolescent literature.

Problem behavior scale. The unconventional or problem behavior scale (HS alpha = .86; UF alpha = .78; UF: $r_{XX} = .83$) was comprised of eight subscales with varying numbers of items per subscale, each item containing five response options ranging from "never" to "6 or more times." Unless otherwise noted, the students were asked about their involvement "during the past year" in a variety of problem behaviors. Self-report of problem behavior has been used by many researchers (e.g., Hirschi, 1969; Jessor & Jessor, 1977; Kline, Canter, & Robin, 1987) and has been shown to be reasonably reliable and valid (Oetting & Beauvais, 1990; Patterson & Stouthamer-Loeber, 1984), perhaps even more so than police records which suffer from under-reporting. The 5-item school misbehavior subscale (HS alpha = .76; UF alpha = .68; UF: $r_{XX} = .65$) addressed issues from copying a classmate's assignment to skipping school without any real excuse (Dornbusch et al., 1985; Gold & Mann, 1972; Lamborn, Brown, Mounts, & Steinberg, 1992; Ruggiero, 1984; Windle, 1993). The 9-item drinking problems subscale (HS alpha = .65; UF alpha = .57; UF: $r_{XX} = .83$) asked, for example, how often "within the past year" the student had been drunk or very high or had been in trouble with a wide variety of other individuals (e.g., parents, friends, police), each mentioned separately (Barnes, 1984; Jessor & Jessor, 1977). In addition, students were asked how many times "within your lifetime" they had been arrested for drunken driving or arrested for other drunken behavior (Jessor & Jessor, 1977). The 2-item alcohol use scale (HS alpha = .87; UF alpha = .83; UF: $r_{XX} = .85$) was formed by combining the frequency of drinking, self-reported on a 5-point scale from "never" to "daily," with amount. Amount was also self-reported on a 5-point scale ranging from "0" to "more than 10" "beers, wine coolers, glasses of wine or mixed drinks" consumed "each time you drink (during one day or in one evening)" (Barnes, 1978, 1984; Rachal et al., 1975). The 5-item drug use scale (HS alpha = .71; UF alpha = .66; UF: $r_{XX} = .74$) asked how often the student used: marijuana; an hallucinogen (acid, LSD, etc.); and cocaine, crack, stimulants, or other hard drugs (Jessor & Jessor, 1977; Ruggiero, 1984). An item asking the number of cigarettes smoked per day was included (Windle, 1993), and finally, the students were asked "Are you high on any substance right now?" which required a "yes" or "no" response. The 2-item lie scale and 3-item steal scale were combined to form a 5-item deceit/theft scale with increased reliability over the other two scales separately (HS alpha = .67; UF alpha = .49; UF: $r_{XX} = .68$). The questions ranged from how often students used a phony ID to how often they took something from someone else worth over

\$30 (Barnes, 1984; Gold, 1970; Gold & Mann, 1972; Ruggiero, 1984; Steinberg et al., 1991; Windle, 1993). The 3-item sex risk scale (HS alpha = .51; UF alpha = .41; UF: $r_{XX} = .93$) asked whether the student was sexually active (Jessor & Jessor, 1977), and, if so, how often condoms were used during sexual intercourse, on a scale from "never" to "always" and asked if the respondent had ever been pregnant (or if male: ever participated in causing a pregnancy to happen). The 5-item aggression subscale (HS alpha = .73; UF alpha = .63; UF: $r_{XX} = .72$) queried frequency of involvement in activities ranging from damaging or vandalizing something not belonging to them to taking part in a fight where a group of friends were against another group (Barnes, 1984; Gold, 1970; Gold & Mann, 1972; Ruggiero, 1984; Steinberg et al., 1991; Windle, 1993). Finally, a 3-item delinquency (HS alpha = .60; UF alpha = .41) scale asked the students "during your lifetime how many times have you been stopped..." and "how many times have you actually been arrested or placed on probation for something you did or they thought you did (not traffic violations)?" The lifetime occurrence of running away from home with intentions of staying away was also queried on this subscale (Dornbusch et al., 1985; Gold & Mann, 1972; Windle, 1993). Because juvenile records are potentially incomplete, self-report allows for more accurate frequency reports of these types of behaviors (McCord, 1990).

Conventional behavior scale. The conventional behavior scale (HS alpha = .72; UF alpha = .62; UF: $r_{XX} = .95$) was composed of two subscales. The first was a 4-item scale of academic aspirations (HS alpha = .73; UF alpha = .42; UF: $r_{XX} = .88$) which contained questions such as the student's self-reported grade point average (GPA; ranging from "mostly As and some Bs" to "mostly Ds and Fs") to the number of years of college the student expected to complete (ranging from "1 year" to "graduate school after college"), each assessed by a single item (Steinberg, Lamborn et al., 1992). Although the use of self-reported GPA is not entirely reliable, it has been found to correlate strongly with actual GPA recorded in school records ($r = .80$, Donovan & Jessor, 1985; $r = .78$, Dornbusch et al., 1990). The second conventional behavior subscale was a 4-item scale of religiosity (HS alpha = .76; UF alpha = .72; UF: $r_{XX} = .95$). Examples of items included were: "How often do you attend church?" (responses ranged from "never" to "two times or more per week") to "When they go to church, what church does your family attend?" This item was based on a fundamentalism scale (Jessor & Jessor, 1977) with five response choices ranging from "My family

never attends church" and "Unitarian, Quaker, or Buddhist" at the lower end to "Church of Christ, Baptist, Jehovah's Witness" etc. at the upper end⁴.

Results

Parenting Style Groups

In order to determine parenting style groups, first, scores on each of the parenting dimension subscales were each divided into three groups following the procedure used by Baumrind (1991a, 1991b). The high group on each subscale was defined as all those parents with scores greater than or equal to 1/2 standard deviation above the mean for that subscale, while members of the low group were those falling at or below 1/2 standard deviation below the mean. Medium-low to medium-high scorers (those falling closer to the mean, between the high and low groups) formed the middle group. A division such as this, although sample specific, assured that marked differences would appear among groups thusly designated for these two normal populations.

Then using the classic fourfold scheme (Maccoby & Martin, 1983), parents were categorized into the first four parenting style groups. Authoritative parents were those in the high groups on both behavioral control and acceptance. Authoritarian parents were those high on behavioral control, but in the low group on acceptance. Indulgent parents were high on acceptance, but low on behavioral control. Neglectful parents were low on both behavioral control and acceptance.

Two additional parenting styles were also defined for this study using the same categorical approach. A fifth parenting style, the "good enough" parents, were those who fell within the middle group on both behavioral control and acceptance (see Baumrind, 1991a). Although the method of using only extreme types of parenting tends to strengthen internal validity of a study (Steinberg et al., 1994), by including a portion of those parents who fall within the moderate ranges of the parenting dimensions (i.e., good enough parents), external validity is also strengthened. In addition, inclusion of a more moderate parenting style allows examination of older adolescent behavioral outcome results in other than "extreme" parenting styles.

Finally, the sixth parenting style, authoritative plus, consisted of those who scored high not only on behavioral control and acceptance, but also scored high on democracy. Because this third parenting dimension is thought to be important in defining authoritative parenting but relatively unimportant in

defining the other parenting styles (Steinberg et al., 1994), it was used only in the definition of this particular parenting style. Inclusion of the democracy dimension set the authoritative plus parent group (high on democracy) apart from the authoritative group (only moderate or low on the democracy dimension). Due to these defining parameters in both the HS and UF samples, a significant difference in level of democracy occurred between the authoritative and authoritative plus parenting style groups. Table 2 indicates the degree to which the democracy dimension serendipitously appeared within each of the other parenting styles. The table also provides information on means and standard deviations of the other parenting dimensions and percentages of students falling within each parenting style group for both the high school and university samples.

As a result of the aforementioned heuristic divisions into specified parenting styles for the study samples, over 40% of each total sample was eliminated from further analyses. Although this procedure could potentially jeopardize the external validity of the study, Table 1 indicates the similarity of each study sample to the total sample from which it was drawn. In nearly every case, the distribution of each variable in the study sample was comparable to that in the original total sample.

Relationship of Parenting Style to Older Adolescent Behavior

Because two separate samples were used in this study, two separate factorial 6 x 2 (Parenting Style x Gender) multivariate analyses of variance (MANOVA) were performed, one each for the high school senior (HS) sample and for the university freshman (UF) sample. By entering all the subtests (variables) of both the problem behavior scale and the conventional behavior scale simultaneously, a test for the overall behavioral model was accomplished for these samples. Other demographic variables were not included either due to a lack of evidence for their influence on parenting style (i.e., family structure: Barnes & Farrell, 1992; Lamborn et al., 1991; SES: Barnes & Farrell, 1992; Steinberg et al., 1991; age: Steinberg, Lamborn et al., 1992) or to too small a sample for reliable results (i.e., ethnicity, with only 10.7% of the HS sample from an ethnic group other than White). The MANOVAS were performed first in order to control for the shared variance among outcome measures.

The HS sample MANOVA for the overall model indicated significant main effects for both parenting style, $F(50, 5540) = 6.77, p < .0001$, and gender, $F(10, 1214) = 22.79, p < .0001$, but no significant

interaction effects for this sample. Although the UF sample MANOVA for the overall model also indicated significant main effects for both parenting style, $F(50, 938) = 1.73$, $p < .05$, and gender, $F(10, 205) = 3.37$, $p < .001$, and no significant interaction effects, the F values for the UF sample were smaller than those found for the HS sample. These results confirm the first hypothesis that parenting style influence would be apparent as related to behavioral outcome in these two older adolescent populations.

The next research question looked at the relationships among the various parenting styles. It was expected that these relationships would be as predictable in older adolescence as they were in middle adolescence (Steinberg & Darling, 1994).

High school senior sample. The highly significant univariate ANOVA tests associated with the HS MANOVA indicated that differences occurred in parenting style for each of the problem behavior and conventional behavior variables at the $p < .0001$ level. These significant F values for every dependent variable allowed for the completion of pairwise comparisons using Scheffe's posthoc test on each of the variables. Table 3 illustrates which parenting style means were significantly different from the others for each of the dependent variables, all at the $p < .05$ level.

In every case the HS students whose parents were neglectful or indulgent participated in significantly more problem behaviors and in significantly less conventional behavior than did those students whose parents were authoritative or authoritative plus. Although the offspring of good enough parents also had significantly worse behavioral outcomes than did the offspring of either authoritative or authoritative plus parents in the majority of the problem behavior areas, their outcomes were significantly superior to those of the neglectfully-reared older adolescents in every case except sex risk (where there was a non-significant difference). Older adolescents from good enough families experienced outcomes which were superior also to the offspring of indulgent parents in the area of alcohol use, drinking significantly less than did older adolescents from either neglectful or indulgent families.

In considering high school seniors reared by authoritarian parents, some of their behaviors were quite positive, such as resisting difficulties in the areas of drinking problems, alcohol use, and drug use, with outcomes not unlike those of the authoritative plus and authoritatively-reared adolescents in these three areas. Their outcomes in these areas were superior to those of the older adolescents from both indulgent

and neglectful families, and these students even showed significantly less alcohol use than offspring of good enough parents. Older adolescents reared by authoritarian parents, however, participated in significantly more problem behavior or less conventional behavior than did authoritative plus and/or authoritative offspring in the areas of school misbehavior, deceit/theft, aggression, delinquency, religiosity, and academic aspirations (see Table 3).

University freshmen sample. In the UF sample, six of the ten MANOVA-associated univariate ANOVA tests of problem behavior and conventional behavior reached significance at the $p < .05$ level (school misbehavior, drinking problems, alcohol use, deceit/theft, aggression, and religiosity), allowing completion of pairwise comparisons for this group on those significant variables. Scheffe's posthoc test was used for pairwise comparisons between parenting styles on each significant dependent variable, but found specific differences on only four of the variables. Table 4 indicates between which parenting styles significant differences occurred.

Older adolescent university freshmen with neglectful parents participated in significantly more school misbehavior than did university freshmen students with authoritarian, authoritative, or authoritative plus parents. They had significantly more drinking problems and significantly greater alcohol use than did those university freshmen with authoritarian parents, and were found to be significantly less religious than students with authoritative plus parents, all at the $p < .05$ level. In addition, students with indulgent parents had significantly greater alcohol use than did either authoritarian or authoritatively-reared students (see Table 4).

A chi square test for independence demonstrated that there was no relationship between parenting style and educational level, $\chi^2 (5, n = 1549) = 1.41, p > .10$. Taken together, these results indicated that not only do predictable differences remain among parenting styles in older adolescence, but also that the distribution of families among the parenting styles generally remains the same for high school seniors and university freshmen. Although the differences in means in the UF sample are in the expected directions, significant differences found among these means are markedly fewer than in the HS sample.

Contributions of Additional Parenting Styles to the Typology

It was expected that the addition of two more parenting styles would enhance the usefulness of the typological theory. Each additional style is discussed separately.

Good enough parenting. In considering good enough parenting, Scheffe's posthoc test of pairwise comparisons was employed as discussed above. In the HS sample the good enough parenting style was significantly different ($p < .05$) from the more beneficial parenting styles (authoritative and/or authoritative plus) as well as the less advantageous styles (neglectful and/or indulgent) in all outcome areas except sex risk where there was not a significant difference (see Table 3). These results indicated that the good enough parenting style made a significant independent contribution to this typological model in the HS sample. However, in the UF sample, good enough parenting was not significantly different from any of the other parenting styles on any of the outcome variables (see Table 4). Depending on the variable, the means of UF older adolescents reared by this parenting style were similar to the means of older adolescents reared by indulgent, authoritative plus, neglectful, authoritarian, or authoritative parents, with the similarities occurring without any predictable pattern.

Authoritative plus parenting. In order to consider the question of whether the democracy dimension makes a unique contribution to, and is therefore necessary in defining, parenting style, three different methods were employed: (1) consideration of the statistical differences in the "natural" occurrence of democracy in each of the parenting styles, (2) consideration of pairwise comparisons of means of outcome measures among the parenting styles, and (3) consideration of stepwise multiple regression on parenting style using the three parenting dimensions and all demographic variables as predictors.

First, referring to the means in Table 2, it is evident that the presence of the democracy dimension "naturally" occurred at significantly different levels in each of the parenting styles. A significant MANOVA (including all three parenting dimensions simultaneously) was found for both educational level groups: HS - $F(15, 3517) = 597.18, p < .0001$; UF - $F(15, 613) = 94.92, p < .0001$. In addition, significant associated univariate ANOVA tests for parenting style on each of the three parenting dimensions and at each educational level (HS and UF) were also significant ($p < .0001$; see Table 2). This allowed pairwise comparisons among parenting styles on each of the parenting dimensions. The relationship of parenting

styles to each other is prescribed by the fourfold typology, at least within the behavioral control and acceptance dimensions. For example, the typology specifies that authoritative parenting must include those parents high on acceptance AND high on behavioral control, while the neglectful parents must be those who score low on acceptance AND low on behavioral control. Therefore, the means of these parenting dimensions were predictably related to each other by the mere definition of each parenting style. By definition also, authoritative plus parenting required that the highest level of the democracy dimension be present in this parenting style. (Recollect: authoritative plus parenting was authoritative parenting -- high on both acceptance and behavioral control -- with the added component of being high also on the democracy dimension.)

In the HS sample, although the democracy mean of indulgent parenting (mean = .75; range = .14 - 1.00) was significantly less than that found in authoritative plus parenting (mean = .84; range = .78 - 1.00), it was significantly greater than the democracy means of neglectful (mean = .67; range = .25 - 1.00), good enough (mean = .69; range = .36 - .94), and authoritative (mean = .67; range = .33 - .75) parenting which were all significantly greater than the democracy mean of authoritarian parenting (mean = .59; range = .22 - .94)⁵. A chi square test for independence was completed to determine if democracy level was related to style of parenting. In the HS sample, the significant chi square for independence, $\chi^2(10, N = 1313) = 661.73, p < .0001$, indicated a strong relationship between level of the democracy dimension (high, moderate, and low) and parenting style. Of the neglectful parents, the largest percentage (45.6%) fell in the low group on democracy, whereas, the largest percentage (49.4%) of the indulgent parents fell within the high group. As would be expected, 43.1% (the largest percentage) of the good enough parents had moderate democracy scores. Of the authoritarian parents, the majority (67.8%) fell in the low democracy group; the majority (69.0%) of the authoritative parents were in the moderate group, and 100% of the authoritative plus parents fell in the high democracy group⁶.

A somewhat different pattern of significance was found in the UF sample with the democracy mean of authoritative plus parenting (mean = .85; range = .81 - .97) comparable to those of indulgent (mean = .77; range = .44 - 1.00) and good enough parenting (mean = .75; range = .50 - .94) which were all three significantly greater than the democracy mean of authoritarian parenting (mean = .59; range = .31 - .86). In

addition, the stipulated high democracy mean of authoritative plus parenting was significantly greater than the democracy means of both authoritative (mean = .71; range = .44 - .78) and neglectful parenting (mean = .71; range = .39 - .94)⁷. Even so, all the parenting styles maintained the same rank order in both the HS and UF samples. In the UF sample, the significant chi square for independence, $\chi^2(10, N = 236) = 117.95, p < .0001$, indicated a strong relationship between the level of the democracy dimension (high, moderate, and low) and parenting style in this sample, too. Considering both of these samples together, the authoritarian parenting style consistently had the lowest level of democracy, while the authoritative plus and indulgent parenting styles had the highest levels of democracy. Interestingly, the authoritative and neglectful parenting styles both contained the same mean level of the democracy dimension in both the HS and the UF samples. Considering that these parenting styles are "polar opposites," it is likely that democracy has little to do with the quality of parenting over and above the effects which are already inherent in these types through the interaction of the acceptance and behavioral control dimensions (or the lack of it).

In order to determine if a specified level of democracy made a significant difference in the quality of parenting, its effect on authoritative parenting alone was considered because this is the parenting style on which the democracy dimension is purported to make a difference (Steinberg et al., 1994). To determine this, the differences among behavioral outcomes were revisited, comparing authoritative and authoritative plus parenting (see Table 3). For the HS sample, both authoritative and authoritative plus parenting were associated with significantly better outcomes on all behavioral measures than were indulgent and neglectful parenting. In the more severe problem behavior areas of aggression and delinquency, only authoritative plus parenting was associated with outcomes which were significantly better than both good enough and authoritarian parenting. However, in the area of religiosity, only authoritative parenting was superior to both good enough and authoritarian parenting. Whereas, taken together, this might suggest a superiority of one style over the other, there was not a significant statistical difference between these two types of authoritative parenting on any of the outcome variables.

In the UF sample (see Table 4), a similar lack of statistical significance occurred between authoritative plus and authoritative parenting on all of the outcome variables. Despite the significant

statistical difference in the presence of the democracy dimension between authoritative and authoritative plus parenting, in no case did a significant behavioral difference occur between these two parenting styles in outcome for older adolescents. In other words, the amount of democracy present did not make a practical difference in the quality of authoritative parenting.

To further consider the contribution of democracy to parenting style, a stepwise multiple regression on parenting style for the HS sample was completed. All demographic variables (age, gender, ethnicity, SES, and family structure), and the three parenting dimensions were entered. Behavioral control was the major contributor to this model, explaining 76.3% of the variance in parenting style. Acceptance made a small additional contribution of 6.4%, followed by democracy at 0.3% and gender at 0.1%, model $R^2 = .831$. In the UF sample using the same variables, behavioral control again made the largest contribution to parenting style, accounting for 73.1% of the variance. Acceptance contributed 7.9%, while democracy contributed only 0.5% of the variance, model $R^2 = .815$. Results of these analyses indicate that the majority of the variance in parenting styles can be explained in both samples, without the addition of the democracy dimension (HS: 82.6%; UF: 81.0%).

Together, the results of the three prior procedures all point toward a lack of additional benefit in classification value from adding the democracy dimension. Although democracy occurs at varying levels in each parenting style, so too does parental school involvement (Steinberg, Lamborn, et al., 1992), yet we do not use this aspect for classification purposes either.

A final procedure is mentioned here which may help explain the results of this study more clearly. Although not included as one of the original hypotheses, an associated finding helps to illuminate the developmental changes in parenting which appear to occur between the senior year in high school and the freshman year in college. An additional MANOVA which controlled for the shared variance among the three parenting dimensions (behavioral control, acceptance, and democracy) compared the HS and UF study samples on these dimensions. The significant MANOVA $F(3,1508) = 19.27, p < .0001$, allowed for the three separate ANOVAS associated with this test, one for each of the parenting dimensions. Significant differences were found between the HS and UF study samples on acceptance, $F(1, 1510) = 19.68, p < .0001$, UF>HS; behavioral control, $F(1, 1510) = 11.84, p < .001$, HS>UF; and democracy, $F(1, 1510) = 10.08$.

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$p < .005$, $UF > HS$. This cross-sectional comparison suggests that as older adolescents mature, or as they leave the direct influence of their parents, (or both), they perceive more acceptance and responsiveness, less behavioral control and demandingness, and more democracy and psychological autonomy-granting from their parents.

Discussion

The results of the present study indicate significant differences in behavioral outcome among older adolescents who characterize their parents as authoritative (or authoritative plus), authoritarian, good enough, indulgent, and neglectful, especially for graduating high school seniors. This finding suggests that the previously established advantages and drawbacks of the four classic parenting styles predictably persist even when this theoretical typology is extended into older adolescence and when a mid-range parenting style is added.

As expected, older adolescents approaching high school graduation, reared by authoritative and authoritative plus parents experience the most favorable outcomes. Not only is neglectful parenting consistently and significantly related to the most negative outcomes for older adolescents in all areas surveyed, but consistently, the indulgently-reared older adolescents also experience outcomes reflecting the gamut of problem behaviors. Authoritarian and good enough parents maintain their expected positions as the "middle two" parenting styles with outcomes which are sometimes positive, but are generally inferior to the two authoritative groups on the outcome variables measured in this study. Authoritarian parenting provides maximum resiliency to older adolescents in the areas of drinking problems, alcohol use, and drug use, but falls significantly short of both types of authoritative parenting in the area of deceit/theft. Authoritarian parenting has associated with it offspring who have significantly worse outcomes than those reared by authoritative plus parents in the areas of school misbehavior, aggression, delinquency, and academic aspirations, and who are significantly less religious than their authoritatively-reared peers. There are no significant differences between the offspring of authoritative and authoritative plus parents on any of the outcome measures. The predictable differences found among the classic parenting styles for this older adolescent population concur with the results found by others in younger age groups (Lamborn et al., 1991; Steinberg et al., 1994).

Extending parenting style theory into a college-aged population also produces significant results, albeit ones that are less dramatic than those of the high school seniors. Institutional selection and self-selection into college which occur following the senior year of high school exclude all but those seniors with higher academic aspirations and those less troubled by problem behavior. These "selected" older adolescents are the constituents who compose this more homogeneous university freshman sample. Necessarily, the homogeneity of this sample results in a restricted range of scores which produces less likelihood of significant differences in the dependent measures. Although the parenting dimension indices used are moderately reliable measures for both the high school senior sample (coefficient alpha range = .68 - .79) and the university freshman sample (coefficient alpha range = .71 - .82), some of the dependent variable measures lack adequate reliability for the university freshmen mostly as a result of the sample's aforementioned restricted range. For example, subscales measuring delinquent behavior (alpha = .41) and academic aspirations (alpha = .42) are less valid in this homogeneous population whose members are generally non-delinquent and maintain reasonably high academic aspirations. Measuring a more diverse older adolescent population at large (including those older adolescents who do not attend college) would clearly produce a less restricted range. Conversely, the scale of alcohol use has good validity (alpha = .83) in a college freshman sample where drinking among students is the norm (Slicker, 1996). Loss of over 40% of the university sample (who did not fit any of the defined parenting styles) through designation to one of six parenting style groups created a somewhat restricted sample size which also tends to attenuate the study results. Inclusion of this 40%, however, would have combined parenting dimension levels that could cloud the distinctiveness and clarity of meaning in these groups.

The present study suggests that the impact of parenting style wanes as adolescents mature and leave the proximal influence of parents to continue on their paths toward autonomy. Factors such as parental acceptance and behavioral control have been found to be less related to problem behavior in university students than in high school students and less related to problem behavior in males than in females (Jessor & Jessor, 1977). The present study concurs with these findings as significant parenting style differences were not as apparent in the university sample as they were in the high school senior sample nor were they present among the males as opposed to the females in the university sample⁸. It appears, then, that

although university freshmen females remain more connected to and continue to be influenced by their parents, university freshmen males are less influenced by distal parenting variables and are more influenced by proximal variables (e.g., the behavior of their close associates) as they assume more autonomy from their parents, but perhaps transfer that position of influence to their peers. Further study of these gender differences in university students is needed, including the process through which males, but not females, free themselves from parental influence.

Although it was hypothesized that two additional parenting styles were needed to complete the spectrum of possible parenting, only one proved to be valid. As expected, the offspring of good enough parents consistently fall between the most favorable and least favorable parenting styles in their behavioral outcomes. This suggests that moderate levels of the acceptance and the behavioral control dimensions are more effective than lower levels of these dimensions, but not as effective as higher levels. These results are similar to those found by Baumrind (1991a) who noted that the middle adolescents in her study coming from good enough families were "adequately but not outstandingly competent, and without serious problem manifestations" (p. 74). Finding moderate levels in behavioral outcome corresponding to a "moderate level" parenting style tends to confirm the previously-discovered linearity of these parenting dimensions (Steinberg et al., 1989). Barnes and Farrell (1992) also found that both mother's report and adolescent self-report showed no evidence of a curvilinear relationship between support (acceptance) and control and behavior measures, but rather found clear linear effects of parenting dimensions on adolescent outcome. The addition of good enough parenting incorporates some of the students who would have heretofore been eliminated through sorting into extreme types. Its inclusion in no way detracts from the study, but rather enhances the meaning of these results by providing a middle ground for comparison. It would appear prudent to continue the use of good enough parenting in future studies.

The effect of democracy on the various parenting styles is dubious. The democracy dimension appears at its highest levels within the authoritative plus and indulgent parenting styles and at its lowest level in the authoritarian style. Because these three parenting styles also vary most notably in the same directions with regard to their levels of acceptance (responsiveness), one might assume that democracy is strongly associated to the acceptance dimension. Indeed, democracy does maintain a low-moderate

correlation with acceptance ($r = .37$ in the HS study sample; $r = .38$ for the UF sample; and it has virtually no relationship to behavioral control. HS: $r = .05$; UF: $r = -.01$), yet this relationship does not explain the moderate presence of democracy within the neglectful parenting style which is nearly bereft of acceptance, as is the authoritarian style. Even though the occurrence of the democracy dimension in parenting style is somewhat predictable, its significance is not clear. As was mentioned earlier, finding equivalent mean levels of democracy in both authoritative and neglectful parenting style groups (the most and the least beneficial parenting styles, respectively) suggests that democracy level per se has little to do with the overall effect of these parenting styles. On the other hand, if we accept the premise that democracy is pertinent only when defining authoritative parenting (Steinberg et al., 1994), then we should see significant differences between authoritative plus parenting (high in democracy) and authoritative parenting (only moderate or low in democracy in this particular study) in our outcome measures. However, despite significantly different levels of democracy, a significant difference in outcome does not appear between authoritative and authoritative plus parenting for any of the dependent measures.

Whereas some authors have suggested that the democracy dimension makes a unique contribution to parenting style (Steinberg et al., 1994), the results of the present study suggest that this is not the case. It appears instead that whether democracy level is specified or not, authoritative (and authoritative plus) parenting is superior to all other parenting styles in regard to positive behavioral outcome for older adolescents.

Cognitive responsiveness was defined by Baumrind (1989) as intellectual stimulation and encouragement of children to express their points of view, particularly during disciplinary discussions. In her studies, she found that cognitive responsiveness (which is conceptually parallel to democracy) did not make a significant independent contribution to any of her outcome variables (cognitive competence, social assertiveness, social responsibility, and general competence) once affective warmth (acceptance) and firm control (behavioral control) had been considered. In other words, Baumrind discovered, as did the present study, that while this dimension contributes to positive outcome, its effects are subsumed as aspects of the combination of the acceptance and behavioral control dimensions. "A typology assumes that the types are more than and different from the sum of their parts" (Baumrind, 1991a). Clearly, high levels of acceptance

and behavioral control "cook" together to create the optimum parenting style even without the specific addition of the democracy ingredient. This becomes clear through the lack of significant outcome differences between authoritative plus and authoritative parenting, as well as through the small additional contribution of democracy to the already substantial variance explained by behavioral control and acceptance in the stepwise multiple regression procedures. The present study, as did Baumrind's (1989), indicates that it is not necessary to add authoritative plus to our list of parenting styles as the influence of authoritative parenting is sufficient to consistently demonstrate the expected beneficial outcomes.

It seems appropriate here to briefly consider the relative comparability of this middle South sample (see Table 1) to the earlier-referenced combined northern and west coast sample used recently by Steinberg and colleagues (specifically see Lamborn et al., 1991). First, in comparing some of the available demographic characteristics of the two high school samples, it can be seen that the present study had far fewer minority students (12.1% compared to 39.1%), fewer intact families (58.3% compared to 64.9%), and a considerably lower parental education (SES) level (31.5% college graduates compared to 70.3%) than did the Lamborn et al. (1991) study. In addition, although the gender split was nearly identical (approximately 52% female), it can be assumed that the prior study's mean age was substantially lower because that study encompassed grades 9-12 and not just high school seniors (mean age in the present study = 17.69 years). Even considering all these demographic differences between the two samples, percentages of students falling into each parenting style (determined by somewhat different procedures) was strikingly similar.

A second relationship between the two samples is seen through comparison of parenting dimension means and standard deviations from the present study with those of Lamborn et al. (1991, p. 1054) and Steinberg et al. (1994, p. 759). This contrast, as did the first one, indicates relative comparability between these diverse study samples (see Table 2). Although studies of this type may have lower external validity due to the selectiveness of the study samples, the comparability of the present sample to this prior sample (noting that the studies were executed in dissimilar geographic regions using samples with dissimilar demographic characteristics) bolsters the generalizability (external validity) of these results.

The present study has many of the common limitations that have affected previous large scale, adolescent self-report, survey studies in the area of parenting style. Common source and method variance necessarily can occur when only one informant is used. The data collected in this self-report study was information filtered through the perceptions of older adolescents; however, it can be argued that these perceptions are valid indicators of what does occur in a family (Jessor & Jessor, 1977). Using the adolescents' perceptions of their parents' behavior, although not necessarily objective, has been found to be equally as important as using measures of the parents' actual behavior (Steinberg, Lamborn et al., 1992), so the practice of using student report of parent behavior is highly prevalent in the current literature (e.g., Lamborn et al., 1991; Steinberg, Lamborn et al., 1992). What was discovered is that older adolescents who characterize their parents in certain ways tend themselves to demonstrate certain patterns of behavior. Increased reliability could be gained through using multiple raters of behavior, such as collecting ratings from both adolescents and their parents. With such a large sample size, however, only the most interested and involved parents would agree to participate, bringing into play the possibility of sampling bias. Rather than sacrificing the large sample size, the present study chose to use only adolescent self-report methods. If only one rater is available, the adolescent appears to be a better rater of parental behavior than are the parents themselves who tend to be unreliable (Schwarz, Barton-Henry, & Pruzinsky, 1985). Parenting self-reports tend to exaggerate positive parenting traits and accentuate social desirability (Barnes & Farrell, 1992; Schwarz et al., 1985). Although some other studies of parenting style have used naturalistic or laboratory observation or parental interview data (Baumrind, 1991a; Patterson & Stouthamer-Loeber, 1984), those researchers employing large-scale adolescent self-report have found "striking comparability" (Lamborn et al., 1991, p. 1062) of their results to the more elaborate techniques.

Another limitation of this study involves the elimination of more than 40% of each sample via designation into parenting style groups, as was mentioned earlier. Although this technique can weaken external validity, inclusion of the good enough parenting style, which added some of those families in the middle ranges on parent dimensions, helps to strengthen this external validity. Internal validity, weakened by the need for active parental consent resulting in potential selection bias, is strengthened by the large sample size. Maximization of differences between the parenting styles also bolsters internal validity.

The students used in this study, notably, are representative groups of "normal" older adolescents, not referred clinic samples. Within these normal samples, significant differences in behavioral outcome occurred among older adolescents reared by the specified parenting styles. The present results are correlational and do not imply causal effects of parenting style. Yet, Steinberg and colleagues have begun establishing some causal evidence through one-year-long longitudinal studies (Steinberg et al., 1989; Steinberg, Lamborn et al., 1992) which indicate that at least a part of the "flow" of influence in a parenting relationship is from parent to child. More studies of an even longer duration are needed to investigate this relationship further.

In conclusion, parenting style theory is expanded and extended by the present study in several important ways and its results warrant consideration. First, results of this study indicate that even within samples of older adolescents the four classic parenting styles, and an additional style, are significantly associated with predictable, differential outcomes in regard to various conventional and problem behaviors. Although the influence of parenting style is less apparent in a university sample in relation to a high school senior sample, its influence is still perceptible in this cross-sectional study. Future directions in older adolescent research, however, should be of a longitudinal nature. By discerning parenting style and behavior proneness for older adolescents prior to college attendance, a more valid determination can be made of exactly what occurs in a older adolescent sample followed over time, rather than assuming correlation through cross-sectional relationships.

Second, it appears that while democracy (psychological autonomy-granting) is present in varying degrees in all parenting styles, its presence does not significantly affect the impact of parenting style beyond those influences already present through the acceptance and behavioral control dimensions. Although the behavioral manifestations of parental democracy in relationships with their adolescents is an important aspect of authoritative parenting, adding it as a third dimension to parent style typology has no foundation in the present results. On the other hand, the good enough parenting style is an important addition to this typology and should be included in future research.

Finally, this study increases the range of adolescents for which parenting style theory is applicable, not only to high school seniors and college freshmen, but also to a geographically diverse section of the United

States, greatly increasing the utility of this typology. Future studies should consider whether continued influence of parenting style occurs throughout the college career or whether all those years of parental influence prior to college suddenly fall away. Jessor and colleagues suggested that this may be the mechanism through which problem behavior dissipates in young adulthood in that when one problem behavior is abandoned, so too are the other problem behaviors in the "syndrome" (Donovan & Jessor, 1985). Longitudinal studies are needed to determine if and how parenting style theory and Problem Behavior Theory are related and their affects on "dropping out" verses completion of a college education.

References

- American Psychological Association. (1992). Ethical principles of psychologists and code of conduct. Washington, DC: author.
- Barnes, G. (1978). Drinking patterns of youth in Genesee county. Buffalo, NY: Research Institute on Alcoholism, New York State Division of Alcoholism and Alcohol Abuse.
- Barnes, G. (1984). Adolescent alcohol abuse and other problem behavior: Their relationships and common parental influences. Journal of Youth and Adolescence, 13, 329-348.
- Barnes, G., & Farrell, M. (1992). Parental support and control as predictors of adolescent drinking, delinquency, and related problem behaviors. Journal of Marriage and the Family, 54, 763-776.
- Baumrind, D. (1967). Child care practices anteceding three patterns of preschool behavior. Genetic Psychology Monographs, 75, 43-88.
- Baumrind, D. (1971). Current patterns of parental authority. Developmental Psychology Monographs, 4(1, part 2), 1-103.
- Baumrind, D. (1978). Parental disciplinary patterns and social competence in children. Youth and Society, 9, 239-276.
- Baumrind, D. (1989). Rearing competent children. In W. Damon (Ed.) Child development today and tomorrow (pp. 349-378). San Francisco: Jossey-Bass.
- Baumrind, D. (1991a). The influence of parenting style on adolescent competence and substance use. Journal of Early Adolescence, 2(1), 56-95.
- Baumrind, D. (1991b). Parenting styles and adolescent development. In R. Lerner, A. Petersen, & J. Brooks-Gunn (Eds.) Encyclopedia of adolescence (Vol. 2, pp. 746-758). New York: Garland.
- Brown, B., Mounts, N., Lamborn, S., & Steinberg, L. (1993). Parenting practices and peer group affiliation in adolescence. Child Development, 64, 467-482.
- Donovan, J., & Jessor, R. (1978). Adolescent problem drinking. Journal of Studies on Alcohol, 39, 1506-1524.
- Donovan, J., & Jessor, R. (1985). Structure of problem behavior in adolescence and young adulthood. Journal of Consulting and Clinical Psychology, 53, 890-904.

- Donovan, J., Jessor, R., & Jessor, S. (1983). Problem drinking in adolescence and young adulthood. Journal of Studies on Alcohol, 44, 109-137.
- Dornbusch, S., Carlsmith, J., Bushwall, S., Ritter, P., Leiderman, H., Hastorf, A., & Gross, R. (1985). Single parents, extended households, and the control of adolescents. Child Development, 56, 326-341.
- Dornbusch, S., Ritter, P., Leiderman, P., Roberts, D., & Fraleigh, M. (1987). The relation of parenting style to adolescent school performance. Child Development, 58, 1244-1257.
- Dornbusch, S., Ritter, P., Mont-Reynaud, R., & Chen, Z. (1990). Family decision making and academic performance in a diverse high school population. Journal of Adolescent Research, 5(2), 143-160.
- Durbin, D., Darling, N., Steinberg, L., & Brown, B. (1993). Parenting style and peer group membership among European-American adolescents. Journal of Research on Adolescence, 3(1), 87-100.
- Gold, M. (1970). Delinquent behavior in an American city. Belmont, CA: Brooks/Cole.
- Gold, M., & Mann, D. (1972). Delinquency as a defense. American Journal of Orthopsychiatry, 42, 463-479.
- Hirschi, T. (1969). Causes of delinquency. Berkeley: University of California Press.
- Jessor, R., & Jessor, S. (1977). Problem behavior and psychosocial development: A longitudinal study of youth. New York: Academic Press.
- Kline, R., Canter, W., & Robin, A. (1987). Parameters of teenage alcohol use: A path analytic conceptual model. Journal of Consulting and Clinical Psychology, 55, 521-528.
- Lamborn, S., Brown, B., Mounts, N., & Steinberg, L. (1992). Putting school in perspective: The influence of family, peers, extracurricular participation, and part-time work on academic engagement. In F. Newmann (Ed.) Student engagement and achievement in American secondary schools (pp. 153-181). New York: Teachers College Press.
- Lamborn, S., Mounts, N., Steinberg, L., & Dornbusch, S. (1991). Patterns of competence and adjustment among adolescents from authoritative, authoritarian, indulgent, and neglectful families. Child Development, 62, 1049-1065.

- Donovan, J., Jessor, R., & Jessor, S. (1983). Problem drinking in adolescence and young adulthood. Journal of Studies on Alcohol, 44, 109-137.
- Dornbusch, S., Carlsmith, J., Bushwall, S., Ritter, P., Leiderman, H., Hastorf, A., & Gross, R. (1985). Single parents, extended households, and the control of adolescents. Child Development, 56, 326-341.
- Dornbusch, S., Ritter, P., Leiderman, P., Roberts, D., & Fraleigh, M. (1987). The relation of parenting style to adolescent school performance. Child Development, 58, 1244-1257.
- Dornbusch, S., Ritter, P., Mont-Reynaud, R., & Chen, Z. (1990). Family decision making and academic performance in a diverse high school population. Journal of Adolescent Research, 5(2), 143-160.
- Durbin, D., Darling, N., Steinberg, L., & Brown, B. (1993). Parenting style and peer group membership among European-American adolescents. Journal of Research on Adolescence, 3(1), 87-100.
- Gold, M. (1970). Delinquent behavior in an American city. Belmont, CA: Brooks/Cole.
- Gold, M., & Mann, D. (1972). Delinquency as a defense. American Journal of Orthopsychiatry, 42, 463-479.
- Hirschi, T. (1969). Causes of delinquency. Berkeley: University of California Press.
- Jessor, R., & Jessor, S. (1977). Problem behavior and psychosocial development: A longitudinal study of youth. New York: Academic Press.
- Kline, R., Canter, W., & Robin, A. (1987). Parameters of teenage alcohol use: A path analytic conceptual model. Journal of Consulting and Clinical Psychology, 55, 521-528.
- Lamborn, S., Brown, B., Mounts, N., & Steinberg, L. (1992). Putting school in perspective: The influence of family, peers, extracurricular participation, and part-time work on academic engagement. In F. Newmann (Ed.) Student engagement and achievement in American secondary schools (pp. 153-181). New York: Teachers College Press.
- Lamborn, S., Mounts, N., Steinberg, L., & Dornbusch, S. (1991). Patterns of competence and adjustment among adolescents from authoritative, authoritarian, indulgent, and neglectful families. Child Development, 62, 1049-1065.

Maccoby, E., & Martin, J. (1983). Socialization in the context of the family: Parent-child interaction. In E. Hetherington (Vol. Ed.), P. Mussen (Series Ed.) Handbook of child psychology, Vol. IV: Socialization, personality, and social development (pp. 1-101).

McCord, J. (1990). Problem behaviors. In S. Feldman & G. Elliott (Eds.) At the threshold: The developing adolescent (pp. 414-430). Cambridge, MA: Harvard University Press.

Oetting, E., & Beauvais, F. (1990). Adolescent drug use: Findings of national and local surveys. Journal of Consulting and Clinical Psychology, 58, 385-394.

Patterson, G., & Stouthamer-Loeber, M. (1984). The correlation of family management practices and delinquency. Child Development, 55, 1299-1307.

Rachal, J., Williams, J., Brehm, M., Cavanaugh, B., Moore, R., & Eckerman, W. (1975). A national study of adolescent drinking behavior, attitudes and correlates. National Institute on Alcohol Abuse and Alcoholism. Washington, DC: U.S. Department of Health, Education, and Welfare.

Ruggiero, M. (1984). Work as an impetus to delinquency: An examination of theoretical and empirical connections. Unpublished doctoral dissertation, University of California, Irvine.

Schaefer, E. (1965). Children's reports of parental behavior: An inventory. Child Development, 36, 413-424.

Schwarz, J., Barton-Henry, M., & Pruzinsky, T. (1985). Assessing child-rearing behaviors: A comparison of ratings made by mother, father, child, and sibling on the CRPBI. Child Development, 56, 462-479.

Slicker, E. (1996). University students' reasons for not drinking: Relationship to alcohol consumption level. Manuscript submitted for publication, Middle Tennessee State University, Murfreesboro.

Smetana, J. (1995). Parenting styles and conceptions of parental authority during adolescence. Child Development, 66, 299-316.

Sneed, C., & Slicker, E. (1996). Proscriptive religious influence on substance use in older adolescents. Manuscript in preparation, Middle Tennessee State University, Murfreesboro.

Steinberg, L. (1990). Autonomy, conflict, and harmony in the family relationship. In S. Feldman & G. Elliott (Eds.) At the threshold: The developing adolescent (pp. 255-276). Cambridge, MA: Harvard University Press.

Steinberg, L., & Darling, N. (1994). The broader context of social influence in adolescence. In R. Silbereisen & E. Todt (Eds.), Adolescence in context: The interplay of family, school, peers, and work in adjustment (pp. 25-45). New York: Springer-Verlag.

Steinberg, L., & Dornbusch, S. (1991). Negative correlates of part-time work in adolescence: Replication and elaboration. Developmental Psychology, 27, 304-313.

Steinberg, L., Dornbusch, S., & Brown, B. (1992). Ethnic differences in adolescent achievement. American Psychologist, 47, 723-729.

Steinberg, L., Elmen, J., & Mounts, N. (1989). Authoritative parenting, psychosocial maturity, and academic success among adolescents. Child Development, 60, 1424-1436.

Steinberg, L., Fegley, S., & Dornbusch, S. (1993). Negative impact of part-time work on adolescent adjustment: Evidence from a longitudinal study. Developmental Psychology, 29, 171-180.

Steinberg, L., Lamborn, S., Darling, N., Mounts, N., & Dornbusch, S. (1994). Over-time changes in adjustment and competence among adolescents from authoritative, authoritarian, indulgent, and neglectful families. Child Development, 65, 754-770.

Steinberg, L., Lamborn, S., Dornbusch, S., & Darling, N. (1992). Impact of parenting practices on adolescent achievement: Authoritative parenting, school involvement, and encouragement to succeed. Child Development, 63, 1266-1281.

Steinberg, L., Mounts, N., Lamborn, S., & Dornbusch, S. (1991). Authoritative parenting and adolescent adjustment across various ecological niches. Journal of Research on Adolescence, 1, 19-36.

Windle, M. (1993). A retrospective measure of childhood behavior problems and its use in predicting adolescent problem behaviors. Journal of Studies on Alcohol, 54, 422-431.

Endnotes

¹Although "passive parental consent" was encouraged, due to the school administrators' wariness over rising parental complaints and legal actions against schools on a variety of issues, and due to the sensitive nature of some of the questions on the survey, most administrators insisted on active written parental consent for all minor students.

²Twenty-two of the college students agreed to complete the survey twice since it was administered in two of their classes. Time between testings ranged from four days to four weeks.

³Gaining permission for even one day of surveying within the classrooms was a particularly challenging task. Therefore, the survey had to be brief enough to be completed in only one day at one 50-minute sitting.

⁴Since this sample was taken from a strong Bible Belt region, the scale of fundamentalism was used as it was suspected that religiosity would impact the study results (Sneed & Slicker, 1996).

⁵Those HS parents who were not classified into any of the parenting style groups were similar to the good enough parents on the democracy dimension (mean = .71; sd = .12; range = .31 - 1.00).

⁶It should be remembered here that by definition of this "hybrid" of authoritative parenting, authoritative plus, all the parents were required to be members of the high democracy group only. This left only those authoritative parents with moderate and low levels of democracy to be members of the "usual" authoritative parenting style.

⁷Those UF parents who were not classified into any of the parenting style groups were similar to the good enough parents on the democracy dimension (mean = .73; sd = .13; range = .33 - .94).

⁸Since a significant effect for gender was found, separate MANOVAS for parenting style were completed for the model (all 10 behavioral outcome measures included) with males and females separately. In the HS sample the results were: for males, Wilks' lambda = .745; $F(50, 2603) = 3.47$, $p < .0001$, and for females, Wilks' lambda = .712; $F(50, 3000) = 4.63$, $p < .0001$. In the UF sample for males, Wilks' lambda = .548; $F(50, 350) = 0.99$, $p > .10$ and for females, Wilks' lambda = .581; $F(50, 569) = 1.44$, $p < .05$, were found. These results suggest that although parenting style significantly impacts behavioral outcome in both males and females at the high school senior level, in the university freshmen population, differences in

outcome among the various parenting styles are significant only for females. Although of interest, due to space constraints gender differences were not considered further in the present report, and all results herein are reported for both genders together.

Table 1. Demographics of Total Samples and Study Samples in Percents for Both Education Level Groups

Descriptor	High school seniors		University freshmen	
	Total sample (N = 2255)	Study sample (n = 1313)	Total sample (N = 419)	Study sample (n = 236)
Gender				
Male	47.9	47.5	37.3	39.7
Female	52.1	52.5	62.7	60.3
Age group				
16-17 years	37.9	37.2	00.0	00.0
18 years	55.2	55.4	54.7	57.2
19-20 years	6.9	7.4	45.3	42.8
Ethnicity				
White	89.3	88.0	84.5	83.9
African American	6.8	7.5	10.5	11.4
Other (Asian, Hispanic, Native American)	3.9	4.6	5.0	4.7
Family Structure				
Intact	59.3	58.3	63.0	62.3
Step-parent	16.2	15.5	10.7	8.5
Other (single-parent, other relative, alone)	24.5	26.3	26.3	29.2
Socioeconomic Status (Parental education)				
High school graduate or lower	52.3	53.1	42.0	42.4
Some college or trade school	15.4	15.4	7.7	19.9
College graduate or higher	32.3	31.5	40.3	37.7
TOTAL	100.0	58.2	100.0	56.3

Table 2. Summary of Univariate ANOVAS from MANOVA Tests on Parenting Dimensions for Each Parenting Style at Both Educational Levels

Parenting dimension	Parenting Style						F	Pairwise comparisons
	Authoritative plus	Authoritative	Authoritarian	Good Enough	Indulgent	Neglectful		
	6	5	4	3	2	1		
High school seniors	(n = 188)	(n = 189)	(n = 137)	(n = 293)	(n = 151)	(n = 324)	df (5, 1276)	p<.0001
Behavioral control mean	.832	.826	.826	.671	.532	.491	1259.02	4.5,6>3>2>1.
Standard deviation	(.054)	(.054)	(.073)	(.038)	(.065)	(.087)		
Acceptance mean	.921	.917	.608	.779	.896	.584	1206.54	2.5,6>3>1.4.
Standard deviation	(.045)	(.046)	(.074)	(.039)	(.044)	(.099)		
Democracy mean	.842	.671	.588	.693	.752	.674	98.10	6>2>1.3.5>4.
Standard deviation	(.053)	(.072)	(.132)	(.107)	(.146)	(.136)		
University freshmen	(n = 31)	(n = 34)	(n = 20)	(n = 59)	(n = 26)	(n = 60)	df (5, 224)	p<.0001
Behavioral control mean	.769	.789	.813	.629	.512	.476	227.28	4.5,6>3>1.2.
Standard deviation	(.047)	(.069)	(.070)	(.033)	(.046)	(.076)		
Acceptance mean	.951	.945	.638	.829	.924	.669	155.23	2.5,6>3>1.4.
Standard deviation	(.035)	(.058)	(.096)	(.033)	(.026)	(.098)		
Democracy mean	.853	.707	.583	.746	.766	.707	17.34	2.3,6>4.6>1.5.
Standard deviation	(.043)	(.079)	(.126)	(.103)	(.124)	(.132)		

Note: Students with missing responses were eliminated from the MANOVAS. Wilks' lambda (HS) for parenting style = .030; $F(15, 3517) = 597.18$, $p < .0001$. Wilks' lambda (UF) for parenting style = .036; $F(15, 613) = 94.92$, $p < .0001$.

Table 3 Summary of Univariate ANOVAS from the MANOVA Test on All Dependent Variables for Parenting Style within the High School Senior Sample

Variable	Parenting Style						Fairwise comparisons $p < .05$
	Authoritative plus (n = 183)	Authoritative (n = 187)	Authoritarian (n = 125)	Good Enough (n = 278)	Indulgent (n = 144)	Neglectful (n = 318)	
School misbehavior	1.04 (.76)	1.29 (.86)	1.45 (.99)	1.67 (.97)	1.74 (1.01)	1.99 (1.14)	1>4>6; 2>5,6; 1>3>5,6.
Drinking problems	.27 (.45)	.34 (.57)	.45 (.70)	.63 (.63)	.78 (.69)	.84 (.81)	1,2>4,5,6; 1>3>5,6.
Alcohol use	1.70 (.91)	1.81 (.95)	1.94 (1.05)	2.39 (1.13)	2.80 (1.15)	2.72 (1.24)	1,2>3>4,5,6.
Drug use	.20 (.43)	.27 (.54)	.43 (.68)	.58 (.76)	.74 (.87)	.89 (.93)	1,2>4,5,6; 1>3>5,6.
Deceit/theft	.14 (.26)	.19 (.41)	.49 (.81)	.44 (.66)	.53 (.72)	.70 (.87)	2,4>5,6; 1>3>5,6.
Sex risk	.49 (.60)	.54 (.61)	.62 (.62)	.72 (.63)	.85 (.64)	.85 (.63)	1,2>5,6; 1>4; 3>6.
Aggression	.09 (.27)	.18 (.46)	.32 (.62)	.32 (.53)	.41 (.69)	.54 (.80)	1>3,4>6; 1,2>5,6.
Delinquency	.12 (.28)	.17 (.41)	.34 (.61)	.30 (.47)	.41 (.59)	.53 (.71)	1>3,4>6; 1,2>5,6.
Religiosity	2.98 (.95)	3.06 (.94)	2.67 (.97)	2.53 (.92)	2.44 (1.03)	2.26 (.98)	6>3; 5,6>2; 5>3,4>1;
Academic aspirations	3.55 (.56)	3.50 (.59)	3.25 (.63)	3.21 (.66)	3.01 (.73)	2.93 (.72)	5>1,3; 5,6>2; 6>3,4>1.

Note (N = 1235). Students with missing responses were eliminated from the MANOVA. Principal entries are means, standard deviations appear in parentheses below each mean.

***p < .0001

Table 4. Summary of Univariate ANOVAS from the MANOVA Test on All Dependent Variables for Parenting Style within the University Freshmen Sample

Variable	Parenting Style						Pairwise comparisons $p < .05$
	Authoritative plus 6 (n = 29)	Authoritative 5 (n = 35)	Authoritarian 4 (n = 20)	Good enough 3 (n = 57)	Indulgent 2 (n = 25)	Neglectful 1 (n = 60)	
School misbehavior	.93 (.71)	.94 (.80)	.76 (.56)	1.20 (.73)	1.28 (.70)	1.50 (.77)	1>4,5,6. 4.53**
Drinking problems	.55 (.62)	.47 (.49)	.29 (.46)	.57 (.51)	.72 (.54)	.85 (.69)	1>4. 3.74*
Alcohol use	2.47 (1.07)	2.16 (1.06)	1.85 (.86)	2.57 (.99)	3.06 (.87)	2.82 (.98)	1.2>4; 2>5. 4.95**
Drug use	.24 (.56)	.37 (.66)	.18 (.32)	.45 (.75)	.58 (.68)	.62 (.76)	1.56
Deceit/theft	.17 (.39)	.23 (.34)	.29 (.56)	.49 (.66)	.38 (.50)	.56 (.68)	2.39* 1.61
Sex risk	.75 (.63)	.72 (.62)	1.05 (.52)	.65 (.53)	.99 (.57)	.86 (.56)	1.61
Aggression	.06 (.17)	.04 (.10)	.09 (.20)	.26 (.44)	.10 (.19)	.25 (.42)	3.20* 6>1.
Delinquency	.32 (.39)	.33 (.51)	.38 (.67)	.45 (.56)	.41 (.47)	.60 (.59)	0.94
Religiosity	3.06 (.84)	2.95 (.86)	2.83 (.63)	2.56 (.88)	2.60 (.77)	2.38 (.98)	2.63* 1.17
Academic aspirations	3.55 (.40)	3.46 (.45)	3.44 (.44)	3.39 (.29)	3.46 (.38)	3.34 (.38)	

Note (N = 226). Students with missing responses were eliminated from the MANOVA. Principal entries are means; standard deviations appear in parentheses below each mean.

* $p < .05$ ** $p < .001$